

## ABSTRACT

A method of optimizing a product factor is provided wherein factors associated with a product are received, including available shelf space sets which may be used to house the product, and a factor to optimize is selected. Functional data for optimizing a factor associated with a product is utilized, wherein the functional data may contain factor data relating to categories, financial data, product identification, and shelf space set data. The method may additionally employ constant value data, comprising values and/or logical expressions, and optimization instruction data, operable to determine an optimal value for a selected factor data. A system for optimizing product placement on store shelves comprises a data collection set of executable instructions operable to collect factor data, and a constraint set of executable instructions operable to receive predetermined values associated with factor data.

15 The invention utilizes functional data for optimizing a factor associated with a product, wherein the functional data may contain factor data relating to categories, financial data, product identification, and shelf space set data. The method may additionally employ constant value data, comprising values and/or logical expressions, and optimization instruction data, operable to determine an optimal value for a selected factor data.

20 A system for optimizing product placement on store shelves is provided comprising a data collection set of executable instructions operable to collect factor data and a constraint set of executable instructions operable to receive predetermined values associated with the factor data. The system may further comprise an optimizing set of executable instructions, operable to calculate an optimal value for at least one factor data.

25